



PREVENTION OPPORTUNITIES UNDER THE BIG SKY

The Prevalence of Falls among Older Montanans

Fall-related injuries are an enormous burden, often resulting in loss of personal independence and in many cases early death, for older persons. The healthcare system is taxed when independent older persons are unable to remain independent either temporarily or permanently because of fall-related injuries such as a fractured hip or traumatic brain injury. Many individuals who fall, even those who are not injured, develop a fear of falling. This fear may cause them to limit their activities, leading to reduced mobility and physical fitness, which increases the risk of falling.¹ Montana has one of the highest mortality rates in the nation for all ages for falls (11 per 100,000). This rate is nearly twice the national fall mortality rate (6 per 100,000).² As Montana's older population continues to increase in number, the negative impact from falls is likely to continue to expand, resulting in more incapacitating injuries and premature deaths to older Montanans.

In response to the high rate of fall-related deaths and injuries in Montana, the Department of Public Health and Human Services has set an objective to reduce the fall rate by implementing a fall prevention program. Establishing the incidence of non-fatal falls is an important step for program intervention and evaluation. The 2006 Behavioral Risk Factor Surveillance Survey (BRFSS) asked respondents about falls. The results indicate that 20% of Montanans age 45 and older have had a recent fall and approximately 1 out of 4 of these sustained an injury from the fall.

The BRFSS Survey The BRFSS is a state-based random digit dial telephone survey of a sample of non-institutionalized adult Montanans.³ Six--thousand and fifty-nine Montanans were surveyed in 2006. The response rate was 69%. Respondents aged 45 and older (n = 4,152) were asked two questions related to falls: "In the past three months, how many times have you fallen?" and "Did any of these falls cause an injury? By an injury we mean the fall caused you to limit your regular activities for at least a day or to go see a doctor."

Who is falling? Who is getting injured from falling?

More than one in five Montanans aged 45 and older reported falling in the past three months (Table). The prevalence of falling was higher among men, persons aged 45 to 64 years, American Indians, unmarried persons, persons with a lower household income, persons with fair to poor health status, and persons reporting a disability compared to respondents without these characteristics. Of respondents falling in the past three months, 58% had fallen one time, 23% two times, and 19% three or more times. Among those falling, 27% were injured due to the fall. Respondents who were injured from a fall were more likely to have fair to poor health status compared to respondents who had fallen but not been injured (34% vs. 24%), and were more likely to be disabled (36% vs. 20%). There were no significant differences in the prevalence of fall-related injuries by sex, age, marital status, or annual household income of respondents.

Table. Prevalence of falls in the past three months among adult Montanans aged 45 and older, 2006.

<u>Characteristics</u>	<u>Percent falling</u>
Total	21
Sex	
Men	22
Women	19
Age (years)	
45-64	22
65+	18
Race	
American Indian	28
White	20
Annual household income	
<\$25,000	25
\$25,000-\$49,999	19
>\$50,00	19
Unknown	20
Marital status	
Married	20
Unmarried	23
General health status	
Fair/poor	36
Good/very good/excellent	17
Disabled	
Yes	31
No	16

Prevention Steps

The good news is that many falls and fall-related injuries can be prevented. Older adults can take several steps to reduce their risk of falling by exercising regularly; reviewing with their doctor or pharmacist the side-effects and potential interactions of all over-the-counter and prescription medications they take; having a vision exam at least once a year; and reducing hazards in their home that can lead to falls.

*Stepping On*⁴ is one example of a fall prevention program that has been shown to reduce the fall rate for

participants by 30%. This intervention improves self-efficacy by teaching fall risks and fall prevention techniques and incorporates regular exercise, home safety modification, vision exams, and behavioral modifications such as wearing safe footwear, hip protectors, and taking calcium and vitamin D. Multi-component best practice interventions of this type help keep older persons active, independent, and in the falls-free category.⁵

Recommendations for fall prevention:

- Encourage older persons to get regular exercise in order to improve mobility, strength, and balance.
- Provide education about fall risk factors.
- Review and adjust current medications for older persons to identify potential side effects or drug interactions that may increase the risk for falls.
- Encourage annual vision exams for early detection of vision changes.
- Recommend older persons check their home for potential fall hazards. Examples are to make sure throw rugs are properly secured to the floor, clutter is removed from walking areas, solid handrails are placed in stairways, grab bars are installed in the bathroom, lighting is placed in dark areas, and encourage the use, both indoors and outdoors, of safe sturdy footwear that has a nonskid sole.

For more information about this report and injury prevention in Montana, contact Bobbi Perkins, Injury Prevention Coordinator at (406) 444-4126 or email at bperkins@mt.gov.

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